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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/706,844	11/07/2000	Richard O. Grant	1139-201	8540
7	590 07/29/2003			
Lieberman & Brandsdorfer LLC 12221 McDonald Chapel Drive Gaithersburg, MD 20878-2252			EXAMINER	
		PRONE, JA		ASON D
			ART UNIT	PAPER NUMBER
			3724	1-17
			DATE MAILED: 07/29/2003	\$ 13

Please find below and/or attached an Office communication concerning this application or proceeding.

*	Application No.	Applicant(s)				
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Office Action Summary	09/706,844	GRANT ET AL.				
Office Action Summary	Examiner	Art Unit				
- The MAILING DATE of this communication ann	Jason Prone	correspondence address				
The MAILING DATE of this communication appears on the cover sheet with the correspondence address Period for Reply						
A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.  - Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.  - If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.  - If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.  - Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).  - Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).  Status						
1) Responsive to communication(s) filed on <u>03 J</u>	<u>uly 2003</u> .					
2a)⊠ This action is <b>FINAL</b> . 2b)□ Thi	s action is non-final.					
3) Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under <i>Ex parte Quayle</i> , 1935 C.D. 11, 453 O.G. 213.						
Disposition of Claims	dina in the condination					
<ul> <li>4) ☐ Claim(s) 1-3,5,6,8-13,15,17 and 19 is/are pending in the application.</li> <li>4a) Of the above claim(s) is/are withdrawn from consideration.</li> </ul>						
	in nom consideration.					
5) Claim(s) is/are allowed.						
6)⊠ Claim(s) <u>1-3,5,6,8-13,15,17 and 19</u> is/are rejec 7)□ Claim(s) is/are objected to.	leu.					
8) Claim(s) are subject to restriction and/or	election requirement					
Application Papers	election requirement.					
9)☐ The specification is objected to by the Examiner						
10)☐ The drawing(s) filed on is/are: a)☐ accepted or b)☐ objected to by the Examiner.						
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).						
11)⊠ The proposed drawing correction filed on <u>28 June 2002</u> is: a)⊠ approved b)⊡ disapproved by the Examiner.						
If approved, corrected drawings are required in reply to this Office action.						
12)☐ The oath or declaration is objected to by the Examiner.						
Priority under 35 U.S.C. §§ 119 and 120						
13) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).						
a) All b) Some * c) None of:						
1. Certified copies of the priority documents have been received.						
2. Certified copies of the priority documents have been received in Application No						
<ul> <li>3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).</li> <li>* See the attached detailed Office action for a list of the certified copies not received.</li> </ul>						
14) Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application).						
a) ☐ The translation of the foreign language provisional application has been received. 15)☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.						
Attachment(s)						
Notice of References Cited (PTO-892)     Notice of Draftsperson's Patent Drawing Review (PTO-948)     Information Disclosure Statement(s) (PTO-1449) Paper No(s)  J.S. Patent and Trademark Office	5) Notice of Information	ry (PTO-413) Paper No(s) I Patent Application (PTO-152)				

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### **DETAILED ACTION**

## Claim Rejections - 35 USC § 103

- 1. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:
  - (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.
- 2. Claims 1, 3-6, 8-13, 15, 17, and 19 are rejected under 35 U.S.C. 103(a) as being unpatentable over Stephens et al. in view of Ustin and Iacona et al. Stephens et al. discloses the invention including an elongate monofilament having a proximal and a distal end (36), a collar (38) secured to the distal end of the monofilament (Column 3 lines 14-24), that the collar has a hollow interior section adapted to receive the monofilament (Column 3 lines 14-24), that the collar comprises a proximal and distal end (Fig. 7), that the distal end of the collar is flush with the distal end of the monofilament and the proximal end of the collar is adapted to extend toward the proximal end of the monofilament (Fig. 7), a cutting head (10) having a housing (12) with a first end (Fig. 1) adapted to be mounted to a drive shaft (16) and a second end (Fig. 2) having an elongate annular flange (24) and an aperture in the flange (32), that collar comprises a hollow circular cross section (Fig. 7), that the collar is crimped to the monofilament (Column 3 lines 15-20), that the crimp forms an indentation into the monofilament forward of the distal end (Fig. 7), that the crimp is adapted to reduce stress and strain on the monofilament (Fig. 7), and that the collar is comprised of a metallic material (Column 3 lines 15-20) but fails to disclose that the proximal end of the

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the life of the monofilament.

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collar comprises a flange, that the flange and the collar are a single concentric unit, that the flange includes an external diameter greater than an external diameter of the collar, that the flange is adapted to place the monofilament adjacent to the aperture, that the distal end of the collar is adapted to encircle a portion of the monofilament extending from the flange to the distal end of the collar, that the proximal end of the flange is placed in communication with the interior wall of the aperture, that a portion of the monofilament extending from the distal end of the collar to the flange rests within the interior wall, and that the collar is within the interior wall. Ustin teaches a proximal end of a collar (22) that comprises a flange (32), that the flange and the collar are concentric (Fig. 1), that the flange includes an external diameter greater than an external diameter of the collar (Fig. 2), and that the distal end of the collar is adapted to encircle a portion of the monofilament extending from the flange to the distal end of the collar (Fig. 2). Therefore, it would have been obvious to one of ordinary skill in the art, at the time of the invention, to have provided Stephens et al. with a concentric flange/collar unit, as taught by Ustin, to have provided unit connected with a monofilament that will extend

lacona et al. teaches that a flange is adapted to place the monofilament adjacent to the aperture (Fig. 7), that the proximal end of the flange is placed in communication with the interior wall of the aperture (83), that the collar is within the interior wall (Fig. 7), and that a portion of the monofilament extending from the distal end of the collar to the flange rests within the interior wall (Fig. 7). Therefore, it would have been obvious to one of ordinary skill in the art, at the time of the invention, to have provided Stephens et

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al. with a trimmer unit incorporating flange/ collar unit, as taught by lacona et al., to have provided a more efficient manner of keeping the monofilament intact during use.

3. Claim 2 is rejected under 35 U.S.C. 103(a) as being unpatentable over Stephens et al. in view of Ustin and Iacona et al. as applied to claim 1 above, and further in view of Fogle. Stephens et al., Ustin, and Iacona et al. disclose the invention but fail to disclose that the monofilament comprises a non-circular uniform cross section from the proximal end to the distal end of the monofilament. Fogle teaches of a monofilament with a non-circular cross section (Figs. 7 and 8). Therefore, it would have been obvious to one of ordinary skill in the art, at the time of the invention, to have provided Stephens et al. in view of Ustin and Iacona et al. with a monofilament with a non-circular cross section, as taught by Fogle, to provide a greater cutting surface area.

### Response to Arguments

4. Applicant's arguments with respect to claims 1-3, 5, 6, 8, 13, 15, 17, and 19 have been considered but are moot in view of the new ground(s) of rejection.

#### Conclusion

- 5. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure. Jones, Cleveland, Burd, Buchanan, Bergan, Marquis, Knowles, Johnson, Ito, Katoh et al., and Nabeshima.
- 6. Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

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A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Jason Prone whose telephone number is 703-605-4287. The examiner can normally be reached on 7:30-5:00, Mon - (every other) Fri.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Allan N. Shoap can be reached on 703-308-1082. In lieu of mailing, it is encouraged that all formal responses be faxed to 703-872-9302.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is 703-308-

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July 28, 2003

Allan A. Shoap Supervisory Patent Examiner Group 3700